

FIG. 1

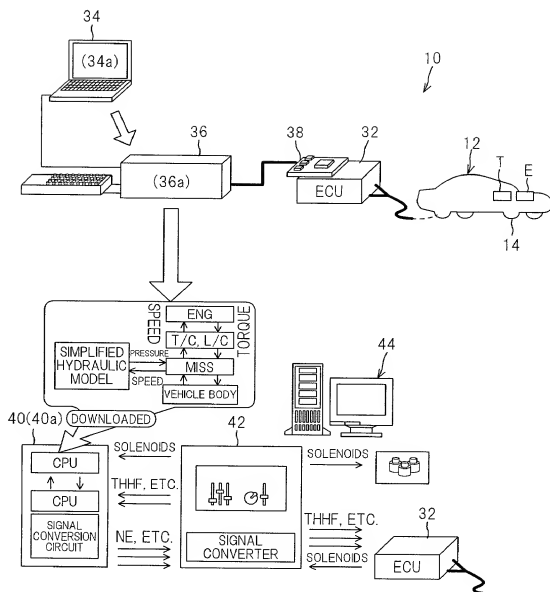
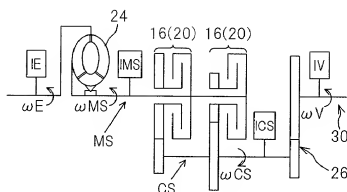


FIG. 2



- $TE - TP - IE \cdot \dot{\omega}E = 0$ (1) ICS: COUNTERSHAFT INERTIA MOMENT
 $TP = \tau \cdot ((\omega E / 2\pi) \cdot 60 / 1000)^2$ (2) IE: ENGINE INERTIA MOMENT
 $TMS = k \cdot TP$ (3) IMS: MAIN SHAFT INERTIA MOMENT
 $TMS - TL - TH - IMS \cdot \dot{\omega}MS = 0$ (4) IV: MOMENT CORRESPONDING TO VEHICLE INERTIA
 $TCS - TL \cdot iL - TH \cdot iH + ICS \cdot \dot{\omega}CS = 0$ (5) IDS: DRIVESHAFT INERTIA MOMENT
 $TDS = TCS \cdot IF$ (6) iH : GEAR RATIO TO BE SHIFTED TO
 $TDS - TV - IDS \cdot \dot{\omega}V = 0$ (7) iL : GEAR RATIO SHIFTED FROM
 ωCS : COUNTERSHAFT SPEED
 ωE : ENGINE SPEED
 ωMS : MAIN SHAFT SPEED
 ωV : DRIVESHAFT SPEED
 TCS : COUNTERSHAFT TORQUE
 TE : ENGINE TORQUE
 TH : TRANSMISSION TORQUE OF CLUTCH TO BE SHIFTED TO
 TMS : MAIN SHAFT TORQUE
 TL : TRANSMISSION TORQUE OF CLUTCH SHIFTED FROM
 TP : TORQUE CONVERTER'S PUMP MEMBER TORQUE
 TV : RUNNING RESISTANCE
 TDS : DRIVESHAFT TORQUE
 k : TORQUE CONVERTER'S TORQUE RATIO
 τ : TORQUE CONVERTER'S PUMP ABSORPTION
 TORQUE AMOUNT COEFFICIENT

PHASE	MAIN SHAFT MS	COUNTERSHAFT CS
LOW-GEAR DRIVING	TMS=TL (8)	TCS=TMS·iL (9)
TORQUE PHASE	TMS=TH+TL (10)	TCS=TMS·iL-TH·(iL-iH) (11)
INERTIA PHASE	TMS=TH-IMS·ωMS (12)	TCS=TH·iH (13)
HIGH-GEAR DRIVING	TMS=TH (14)	TCS=TMS·iH (15)

FIG. 3

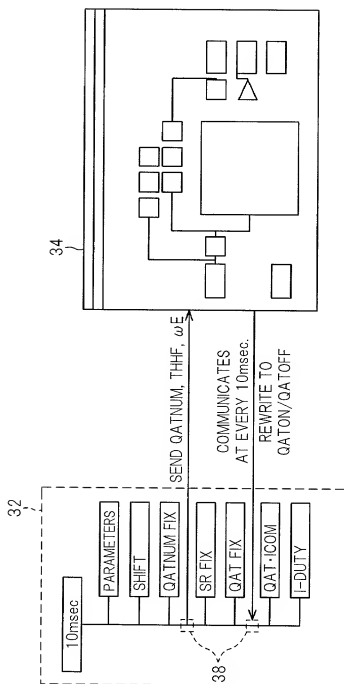
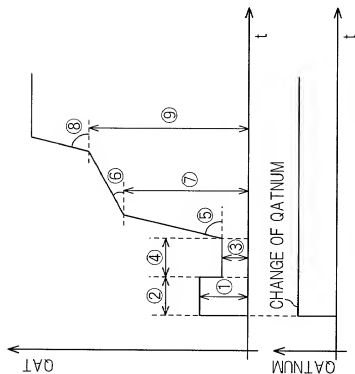
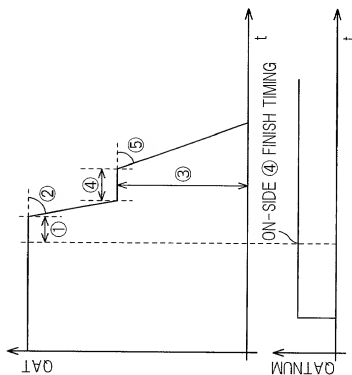


FIG. 4



PORTION	COMMAND	UNIT
①	INITIAL PRESSURE	kg/cm ²
②	TIME FOR PLAY-REMOVING CLUTCH PISTON STROKE	sec
③	PREPARATORY PRESSURE	kg/cm ²
④	PREPARATORY PRESSURE KEEPING TIME	sec
⑤	ON-SIDE PRESSURE RISING SPEED	kg/cm ² /sec
⑥	FIRST DESIRED ON-SIDE PRESSURE	kg/cm ²
⑦	ON-SIDE PRESSURE RISING SPEED	kg/cm ² /sec
⑧	SECOND DESIRED ON-SIDE PRESSURE	kg/cm ²
⑨	ON-SIDE PRESSURE RISING SPEED	kg/cm ² /sec

FIG. 5



PORTION	COMMAND	UNIT
①	PREPARATORY TIME	sec
②	OFF-SIDE PRESSURE DROPPING SPEED	kg/cm ² /sec
③	DESIRED OFF-SIDE PRESSURE	kg/cm ²
④	OFF-SIDE PRESSURE KEEPING TIME	sec
⑤	OFF-SIDE PRESSURE DROPPING SPEED	kg/cm ² /sec

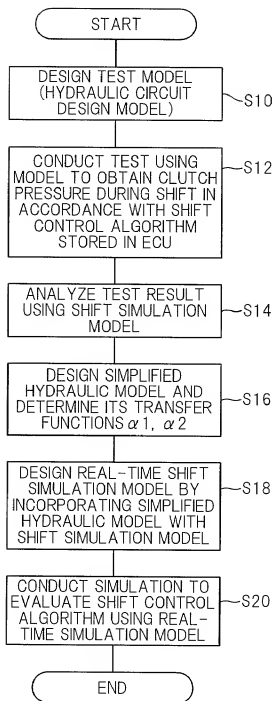
FIG. 6

FIG. 7

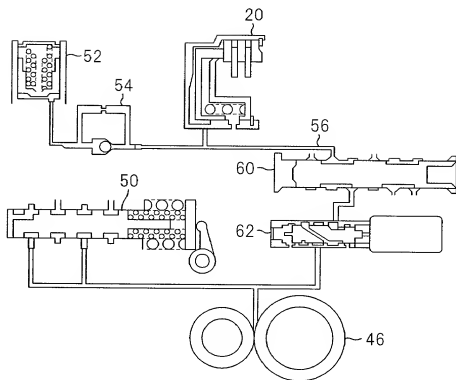


FIG. 8

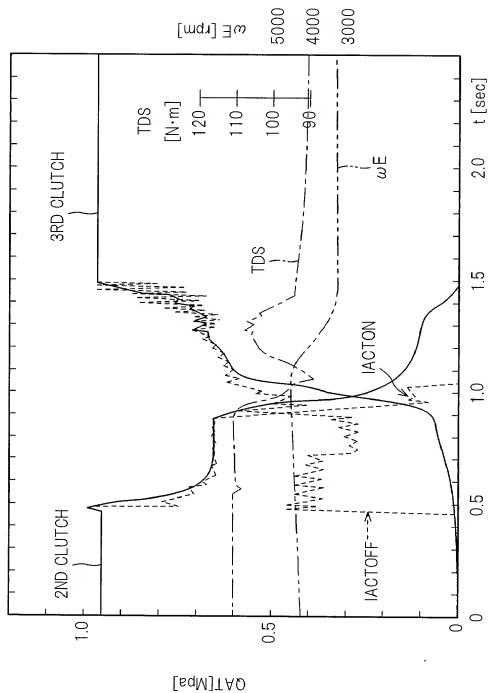


FIG. 9

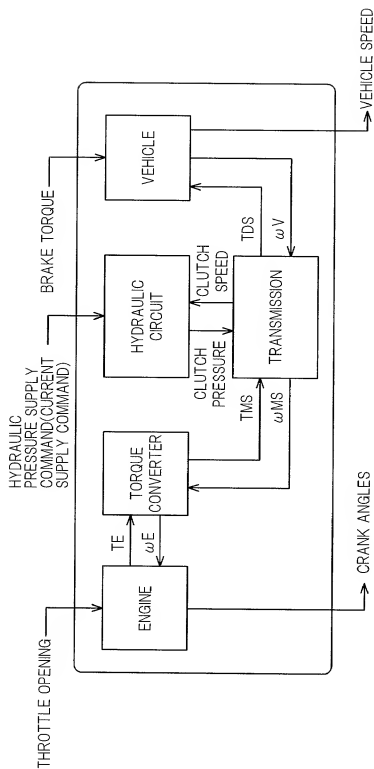


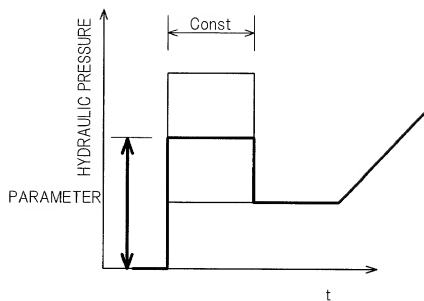
FIG. 10

FIG. 11

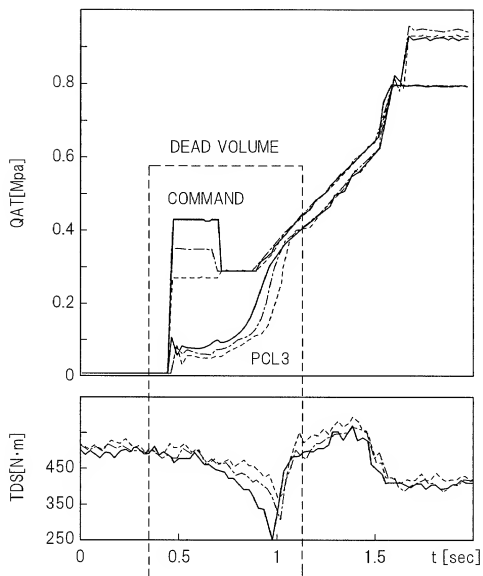


FIG. 12

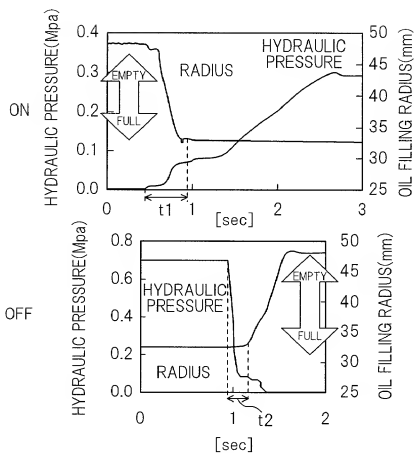


FIG. 13

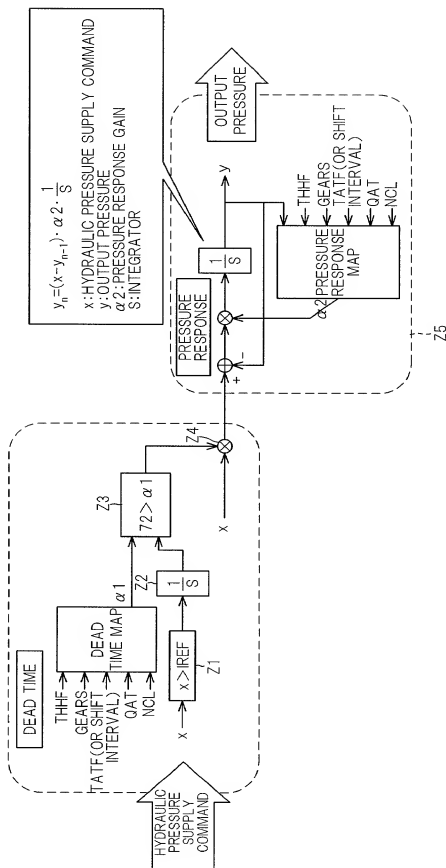


FIG. 14

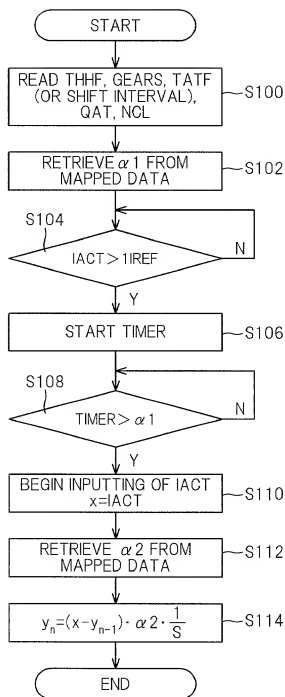


FIG. 15A

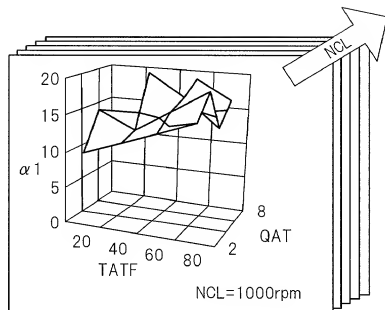


FIG. 15B

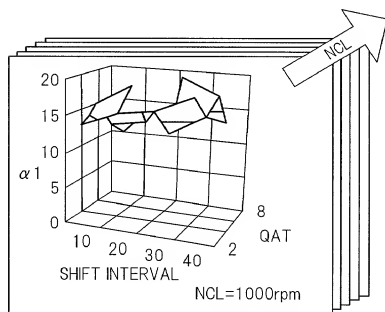


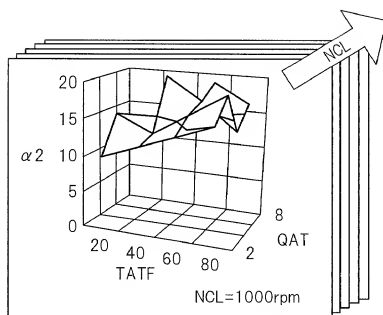
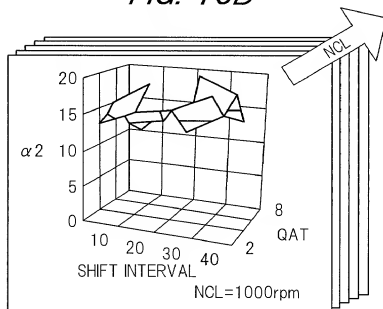
FIG. 16A**FIG. 16B**

FIG. 17

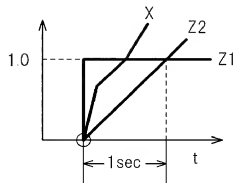


FIG. 18

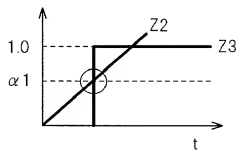


FIG. 19

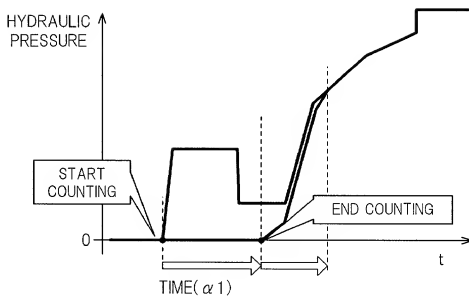


FIG. 20

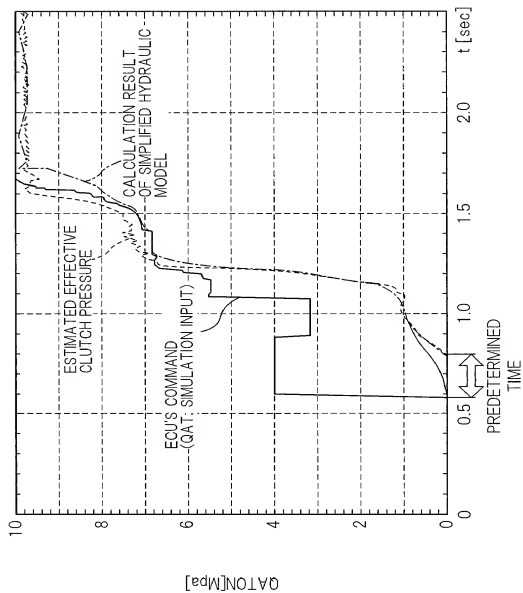


FIG. 21

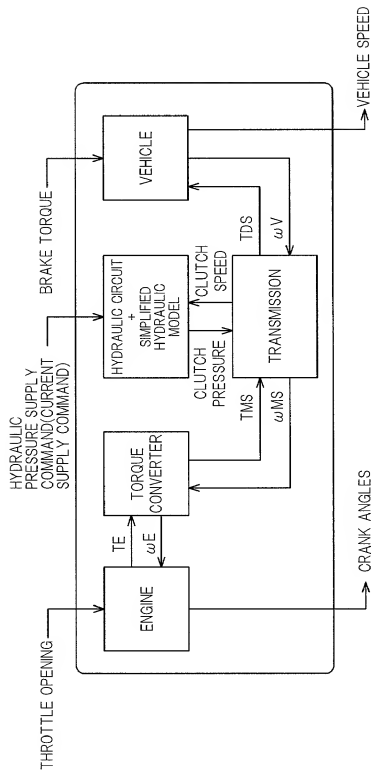


FIG. 22

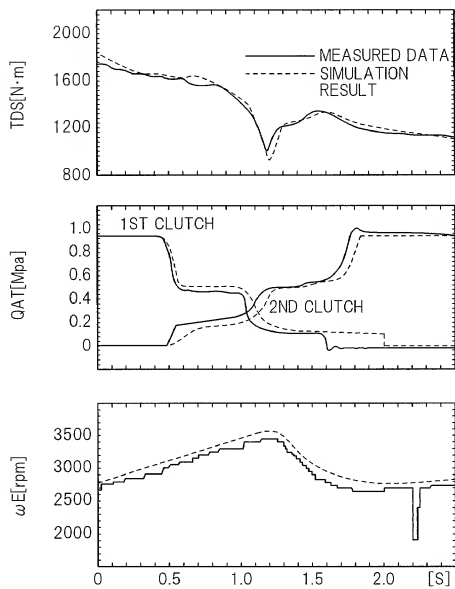


FIG. 23

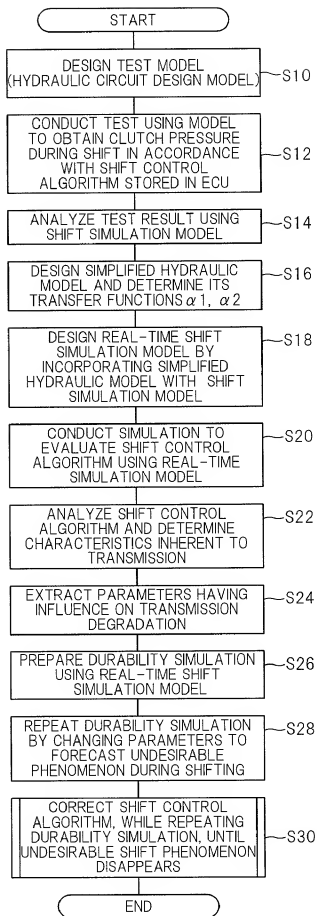


FIG. 24

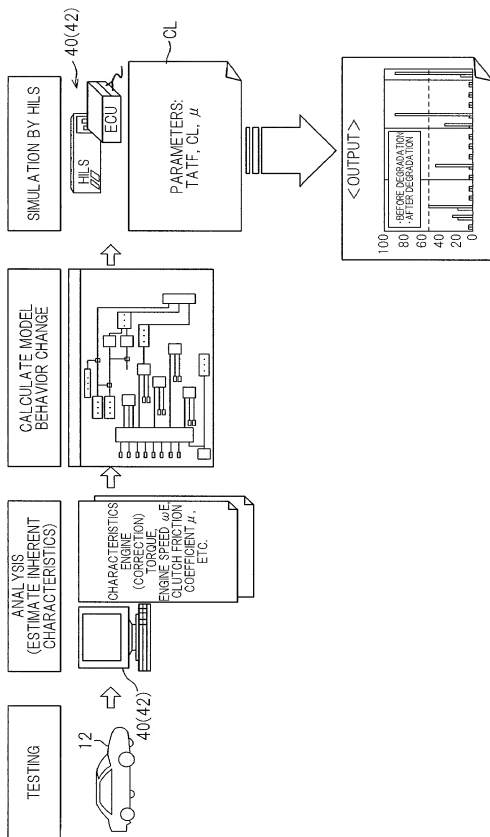


FIG. 25

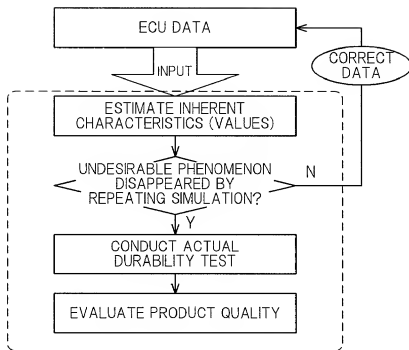


FIG. 26A

34up	1/8	2/8	4/8	6/8	8/8
23up	1/8	2/8	4/8	6/8	8/8
12up	1/8	2/8	4/8	6/8	8/8
mu _{hon}	0.147	0.145	0.133	0.123	0.125
mu _{hoff}	0.15	0.14	0.14	0.13	0.14
mu _{non} [rpm]	300	600	600	600	1300
mu _{noff} [rpm]	50	50	50	50	50
TE CORRECTION BEFORE SHIFTING[kgf·m]	-1	-1	-1	-1	-1
TE CORRECTION AFTER SHIFTING[kgf·m]	-1	-1	-1	-1	-1

FIG. 26B

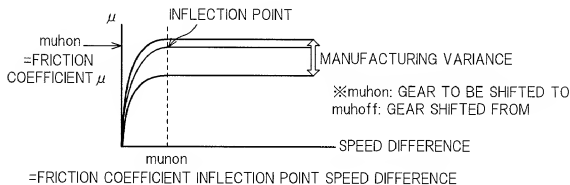
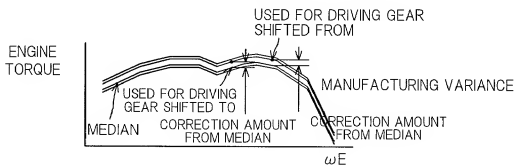


FIG. 26C



ECU DATA

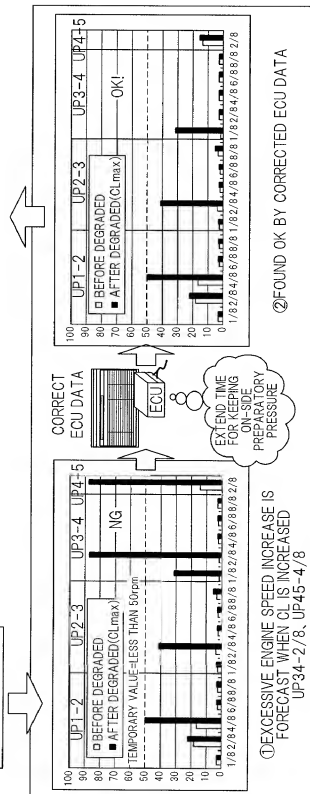
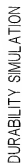


FIG. 28

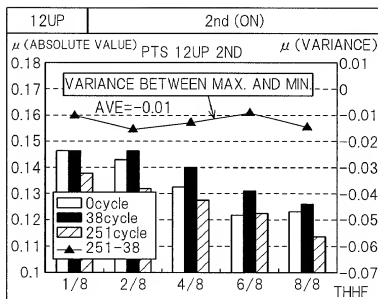


FIG. 29

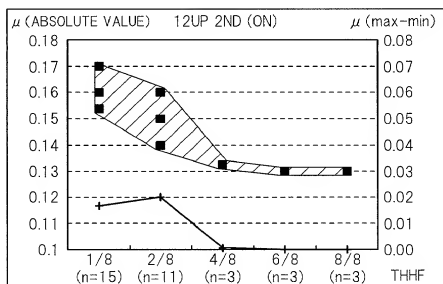


FIG. 30

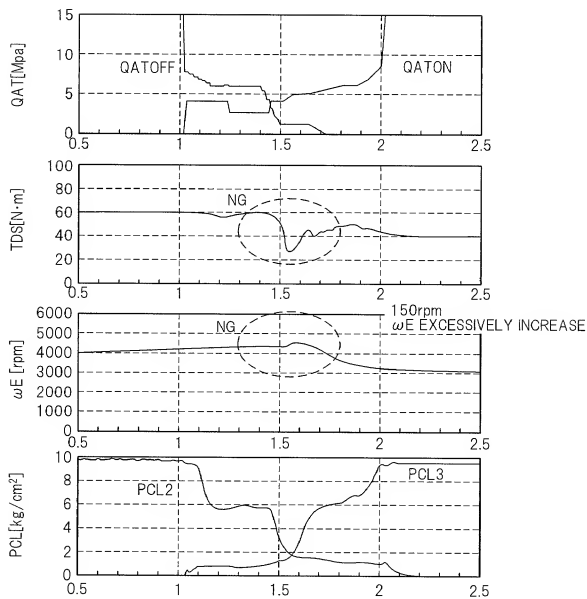


FIG. 31

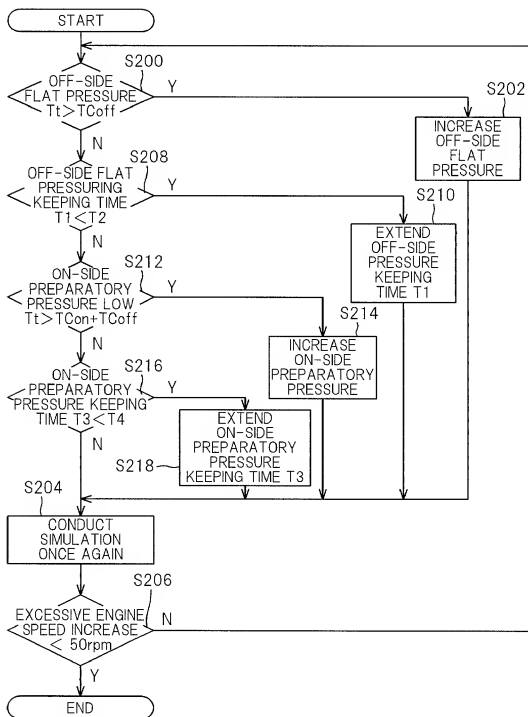


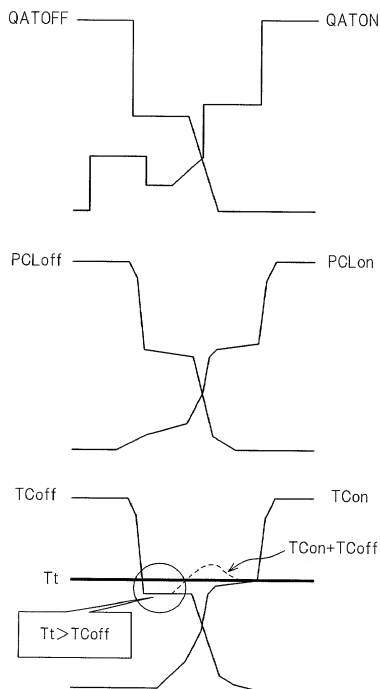
FIG. 32

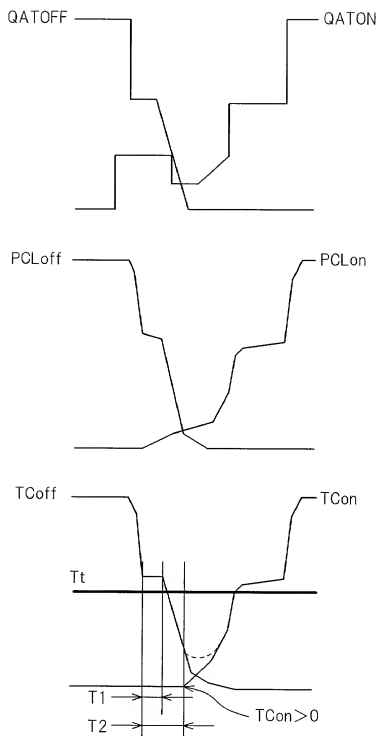
FIG. 33

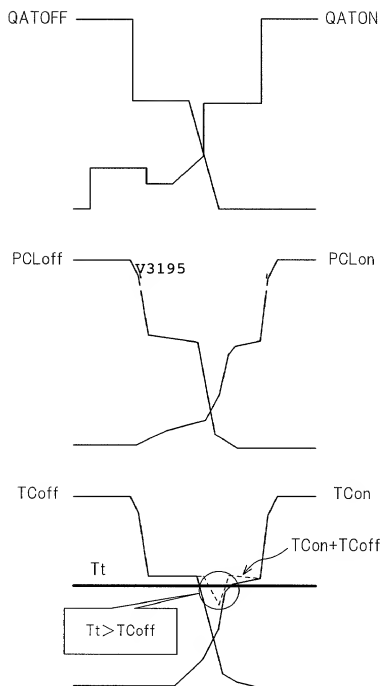
FIG. 34

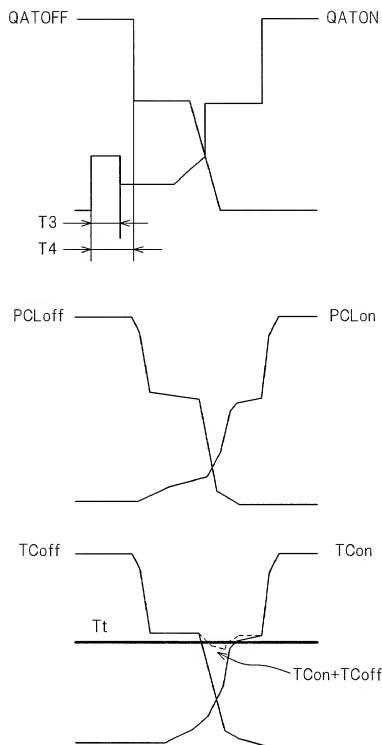
FIG. 35

FIG. 36

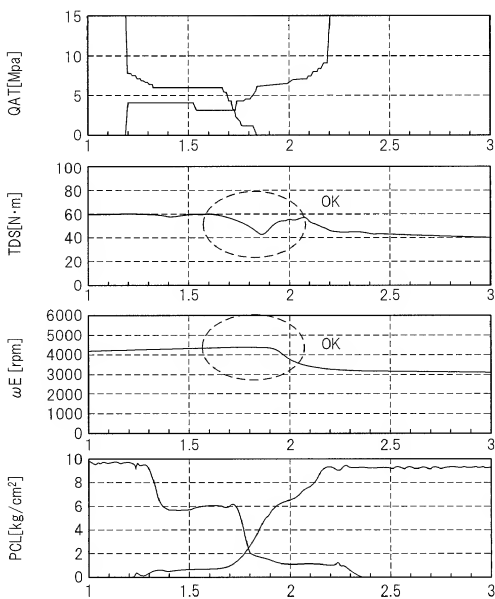


FIG. 37